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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/813,079	03/31/2004	Kiwamu Fujimoto	251289US2	5649

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EXAMINER	
GOUDREAU, GEORGE A	

ART UNIT	PAPER NUMBER
1763	

DATE MAILED: 06/30/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/813,079	FUJIMOTO, KIWAMU	
	Examiner	Art Unit	
	George A. Goudreau	1763	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *06 April 2006*.

2a)☒ This action is FINAL. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *2,3,5,10 and 21-32* is/are pending in the application.

4a) Of the above claim(s) *23-32* is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *2,3,5,10,21 and 22* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

George A. Goudreau
GEORGE GOUDREAU
PRIMARY EXAMINER
6-06

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

1. Applicant's election with traverse of the first species (i.e.-embodiment for controlling the temperature of the wafer) in the reply filed on 4-6-06' is acknowledged. The traversal is on the ground(s) that there is no serious imposed upon the examiner by requiring the examiner to search each of the three methods (i.e.-species) which applicant claims for controlling the temperature of the wafer since the search for each of these species would overlap. This is not found persuasive because there is a serious burden placed upon the examiner by requiring the examiner to search all three methods (i.e.-species) which are claimed by the applicant for controlling the temperature of the wafer since the search for each of these species is not identical to each other. This would then require additional work is done to search all three species over that which would be required to search for a single species.

The requirement is still deemed proper and is therefore made FINAL.

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

3. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor

and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

4. Claims 2-3, 5, 10, and 21-22 are rejected under 35 U.S.C. 103(a) as being unpatentable over the references as applied in paragraph 6 of the last office action on the merits further in view of Matsuda et. al. (5,514,243).

The references as applied in paragraph 6 of the previous office action on the merits fail to disclose the usage of a dielectric film on the electrostatic chuck, which has a resistivity of less than 10 E 12 ohm-cm.

Matsuda et. al. teach that it is desirable to coat the surface of an electrostatic chuck which is used to support a wafer in a rie etching process with a dielectric film which has a resistivity of (10 E 8 ohm-cm to 10 E 9 ohm-cm). They further teach that the usage of such a dielectric coating reduces the amount of undesirable damage done to a wafer during the rie-etching step due to the amount of electrostatic charge, which remains, on the surface of the wafer. This is discussed specifically in the abstract; and discussed in general in columns 1-6. This is shown in figures 1-5.

It would have been obvious to one skilled in the art to employ the plasma etcher which is taught by Matsuda et. al. to conduct the etching process, which is taught above, based upon the following. Matsuda et. al. teach that the usage of their rie etching apparatus is desirable in order to reduce the amount of damage done to a wafer during a rie etching step. Further, the usage of the rie etcher

taught by Matsuda et. al. simply provides an alternative, and at least equivalent means for conducting the etching process taught above to the specific means, which are taught above.

5. Claim 22 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

-The wording used throughout claim 22 is written in a very confusing manner, and should be rewritten. In claim 22, applicant recites that the adsorptive holding member is a dielectric film layer formed on a backside of the object. Since the adsorptive hold member is not part of the wafer to be etched (i.e.-the object), the wording used by applicant in this claim is incorrect. The dielectric film layer is not formed on the object to be etched but on the surface of the electrostatic chuck. Further, applicant's usage of the term "film layer" in this claim is confusing.

6. Applicant's arguments with respect to claims of record have been considered but are moot in view of the new ground(s) of rejection.

7. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory

action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

8. Any inquiry concerning this communication should be directed to examiner George A. Goudreau at telephone number (571)-272-1434.

George A. Goudreau
Primary Examiner
Art Unit 1763